



**PATENT APPLICATION**

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

**Inventor(s):** Ba-Zhong Shen, Ph.D.,  
Hau Thien Tran, and  
Dr. Kelly Brian Cameron

**Application Serial No:** 10/669,177

**Application Filing Date:** 09/23/2003

**Patent No:** n/a

**Patent Issue Date:** n/a

**Title:** Iterative metric updating when decoding LDPC (Low Density Parity Check) coded signals and LDPC coded modulation signals

**Examiner:** n/a

**Art Group:** 2184

**Confirmation No:** 4091

**Attorney Docket No:** BP3036.1

Date: Saturday, August 21, 2004 (08/21/2004)

Mail Stop Amendment  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

**PRELIMINARY AMENDMENT**

Dear Sir or Madam:

The Applicant respectfully requests that the Examiner enter the amendment to the "CROSS REFERENCE TO RELATED PATENTS/PATENT APPLICATIONS" section as indicated below.

On page 1, starting at line 4, and continuing to the bottom of page 1 of the originally filed written specification, please amend the "CROSS REFERENCE TO RELATED PATENTS/PATENT APPLICATIONS" section as follows:

**"CROSS REFERENCE TO RELATED PATENTS/PATENT APPLICATIONS**

The present U.S. Utility Patent Application claims priority pursuant to 35 U.S.C. § 119(e) to the following U.S. Provisional Patent Application Applications which is ~~are~~ hereby incorporated herein by reference in its ~~their~~ entirety and made part of the present U.S. Utility Patent Application for all purposes:

1. ~~U.S. Provisional Patent Application Serial No. 60/384,698, entitled "Variable code rate and signal constellation turbo trellis coded modulation code," (Attorney Docket No. BP 2333), filed May 31, 2002 (05/31/2002), pending.~~

1.2. U.S. Provisional Application Serial No. 60/478,690, "Coded modulation with LDPC (Low Density Parity Check) code using variable maps and metric updating," (Attorney Docket No. BP3036), filed June 13, 2003 (06/13/2003), pending.

The ~~present U.S. Utility Patent Application also claims priority pursuant to 35 U.S.C. § 120 to the~~ following U.S. Utility Patent Application which is hereby incorporated herein by reference in its entirety and made part of the present U.S. Utility Patent Application for all purposes:

1. U.S. Utility Application Serial No. 10/264,486, entitled "Variable code rate and signal constellation turbo trellis coded modulation codec," (Attorney Docket No. BP 2333), filed October 4, 2002, pending, which claims priority pursuant to 35 U.S.C. § 119(e) to U.S. Provisional Patent Application Serial No. 60/384,698, entitled "Variable code rate and signal constellation turbo trellis coded modulation codec," (Attorney Docket No. BP 2333), filed May 31, 2002 (05/31/2002), pending.

The following U.S. Utility Patent Application, being filed concurrently, is hereby incorporated herein by reference in its entirety and made part of the present U.S. Utility Patent Application for all purposes:

1. U.S. Utility Patent Application Serial No. 10/669,066, entitled "Variable modulation within combined LDPC (Low Density Parity Check) coding and modulation coding systems," (Attorney Docket No. BP3036), filed September 23, 2003 (09/23/2003), pending."

The Examiner is invited to contact the undersigned by telephone or facsimile if the Examiner believes that such a communication would advance the prosecution of the present patent application, or if the Examiner has any additional questions or concerns.

RESPECTFULLY SUBMITTED,

By: Shayne X. Short

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